

WIRELESS COMMUNICATION NETWORK FOR ENABLING INTERNET ACCESS

ABSTRACT OF THE DISCLOSURE

A fixed wireless communication network (20) is configured
5 to transfer Internet Protocol (IP) data packets (122) between
customer devices, or local area networks (22), located at
customer premises (24) and the Internet. The wireless network
(20) includes subscriber nodes (26) located at the customer
premises (24). Each of the subscriber nodes (26) includes a
10 router (108) interconnected with one of the local area networks
(22) at the customer premise (24) for receiving the IP data
packets (122) from the local area network (22). A control node
(28) is in wireless communication with subscriber nodes (26)
over the industrial, scientific, and medical (ISM) band for
15 transmitting the IP data packets (122). A network aggregation
node (30) is in communication with the control node (28) and
enables transfer of the IP data packets (122) between the
control node (28) and an Internet backbone (50).